

# Helicopter Performance

June 29, 2004

By  
Al Salinas, Ph.D.  
Flight Performance Support  
to  
Aeromechanics Engineering  
Directorate

# Performance Requirements

- JMPS System/Subsystem Specification (SSS)
  - JMPS 010
    - 3.2.3.1.3.1.1 Performance Data
  - JMPS 011
    - 3.2.3.1.4.1 TOLD/Launch Definition
  - JMPS 012
    - 3.2.3.1.4.2 TOLD Recovery/Divert Definition
  - JMPS 021
    - 3.2.3.3.2.1.6 Route Maneuver Planning
  - JMPS 025
    - 3.2.3.3.3 Aircraft Performance Calculations
  - JMPS 042
    - 3.2.3.6.1 Platform/Route Performance Analysis
  - JMPS 043
    - 3.2.3.6.2 Weight and Balance Analysis
  - JMPS 086
    - 3.7.4 Violations of Parameters
  - JMPS 098
    - 3.12.4.1 Generic UPC

# Performance Planning

- Helicopter Standards:
  - April 04 meeting at Tybrin
  - Identify Standardized FPM IDs
  - Current status
- Assumptions:
  - PFPS vs JMPS
  - Route, hover calculations
- Design Interface:
  - PFPS
  - JMPS
  - Transfer
  - PPC, HOPS
- Hover Tool:
  - Defined requirements?
  - Drag, Store weight, Cargo weight
  - Wind
    - hover heading, headwind component
- Weight and Balance
  - working group?

# Summary

- Helicopter Standards:
  - Suspense date?
  - FPM ID definitions (how calculated)
- Requirements
  - fully define
  - who takes action?
- Assumptions:
  - define assumptions
  - who takes action?
- Interface design
  - Usability
- Hover Tool:
  - fully define
  - who takes action?
- Weight and Balance
  - needs defined?
  - who takes action?